Applicants' Response

The claims can be classified into three groupings:

(1) Those claims that were allowed (claims 1, 6-11, 14-19, 28 and 30) ;

(2) Those claims that were allowable pending suggested modifications (claims 3-5, and 22, 24-25, and 37-38); and

(3) Those claims currently rejected under either 35 USC 102 or 103 (claims 12-13, 20-21, 23, 26-27, 29, 31-36, 39-44).

The Examiner has indicated that claims 3-5 were allowable if rewritten to overcome the rejections under 35 USC 112, second paragraph by indicating they are dependent on Claim 1. Applicants have done so, and respectfully request the present rejection to claims 3-5 be removed and that they be allowed to issue with the current set of allowed claims.

The Examiner indicated claims 3-5, and 22, 24-25, and 37-38 would also be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. Applicants have submitted amended claims which include all the limitations of any intervening claim.

Applicants have presently withdrawn claims 12-13, 20-21, 23, 26-27, 29, 31-36, 39-44, rending the present rejections as moot, but reserve the right to reintroduce these claims at a latter time.

Applicants respectfully request that Claims 1, 3-5, 6-11, 14-19, 22, 24, 25, 28, 30 and 37 and 38 be allowed to issue.

Respectfully submitted,

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PENDING CLAIMS AS AMENDED
(MARKED UP VERSION)

WHAT IS CLAIMED IS:

1. (previously presented) An electrically insulating material comprising a polymeric component and at least one linked voltage stabilizing agent, wherein the voltage stabilizing agent is covalently lined to or within the polymeric component.

2. (canceled) The electrically insulating material of claim 1 wherein the voltage stabilizing agent is covalently linked to or within the polymeric component.

3. (currently amended) The electrically insulating material of claim 1 wherein the voltage stabilizing agent is covalently incorporated into the backbone of the polymeric component.

4. (currently amended) The electrically insulating material of claim 1 wherein the voltage stabilizing agent is covalently attached pendant to the backbone of the polymeric component.

5. (currently amended) The electrically insulating material of claim 1 further comprising a spacer between the polymeric and the voltage stabilizing agent.

6. (original) The electrically insulating material of claim 1 wherein the polymeric component comprises a polymer selected from the group consisting of a silicone, a polyurethane, a polyolefin, a polyacetal, a polycarbonate, a polyvinyl, a polyamide, a polyimide, a polyacrylic, a polystyrene, a polysulfone, a polyetherketone, a cellulosic, a polyester, a polyether, a fluoropolymer, and copolymers thereof.

7. (original) The electrically insulating material of claim 6 wherein the polymeric component comprises at least one copolymer selected from the group consisting of an olefin-vinyl copolymer, an olefin-allyl copolymer, a polyether copolymer, and a polyamide copolymer.

8. (original) The electrically insulating material of claim 7 wherein the polymeric component comprises a polyether-bis-amide copolymer.

9. (original) The electrically insulating material of claim 6 wherein the polymeric component comprises at least one polymer selected from the group consisting of silicone, a polyurethane, a polyimide and a polyamide.

10. (original) The electrically insulating material of claim 1 wherein the voltage stabilizing agent comprises an electron acceptor group, an electron donor group, and a double bond or a conjugated ring system.

11. (original) The electrically insulating material of claim 1 which is a solid, a gel, a gum, or a fluid.

12. (withdrawn) A method for making an electrically insulating material comprising polymerizing at least one monomer comprising at least one voltage stabilizing agent.

13. (withdrawn) A method for making an electrically insulating material comprising copolymerizing at least one first monomer comprising at least one voltage stabilizing agent and at least one second monomer to yield a polymeric electrically insulating material.

14. (original) A method for making an electrically insulating material comprising covalently attaching at least one voltage stabilizing agent pendant to a polymeric backbone to yield a polymeric electrically insulating material.

15. (previously presented) An article comprising an electrically insulating material comprising a polymeric component and at least one linked voltage stabilizing agent, wherein the voltage stabilizing agent is covalently lined to or within the polymeric component.

16. (original) The article of claim 15 wherein the electrically insulating material is an integral part of the article.

17. (original) The article of claim 15 wherein the electrically insulating material is a coating.

18. (original) The article of claim 15 wherein the electrically insulating material is a solid, a gel, a gum or a fluid.

19. (original) The article of claim 15 wherein the polymeric component comprises a polymer selected from the group consisting of a silicone, a polyurethane, a polyolefin, a polyacetal, a polycarbonate, a polyvinyl, a polyamide, a polyimide, a polyacrylic, a polystyrene, a polysulfone, a polyetherketone, a cellulosic, a polyester, a polyether, a fluoropolymer, and copolymers thereof.

20. (withdrawn) A medical device comprising an electrically insulating material comprising at least one voltage stabilizing agent.

21. (withdrawn) The medical device of claim 20 which is an implantable medical device.

22. (currently amended) The implantable medical device [of claim 21] comprising an electrically insulating material having at least one voltage stabilizing agent and wherein the implanted medical device is selected from the group consisting of an implantable cardioverter/defibrillator (ICD), an implantable medical lead, an implantable pulse generator (IPG), a pacemaker-cardioverter-defibrillator (PCD), an neurostimulator, and nerve stimulator, a muscle stimulator, an implantable monitoring device, an implantable fluid handling device, a defibrillator, an implantable gastric stimulator, an implantable drug pump, and an implantable hemodynamic monitoring device.

23. (canceled) The implantable medical device of claim 20 wherein the electrically insulating material comprises a polymeric component comprising at least one linked voltage stabilizing agent.

24. (currently amended) [The] An implantable medical device [of claim 23] comprising an electrically insulating material having at least one voltage stabilizing

agent wherein the voltage stabilizing agent is covalently linked to or within the polymeric component

25. (original) The implantable medical device of claim 24 selected from the group consisting of an implantable cardioverter/defibrillator (ICD), an implantable medical lead, an implantable pulse generator (IPG), a pacemaker-cardioverter-defibrillator (PCD), an neurostimulator, and nerve stimulator, a muscle stimulator, an implantable monitoring device, an implantable fluid handling device, a defibrillator, an implantable gastric stimulator, an implantable drug pump, and an implantable hemodynamic monitoring device.

26. (withdrawn) An implantable medical lead comprising an electrically insulating material comprising a polymeric component selected from the group consisting of a silicone, a polyurethane, a polyamide, a polyimide, and a polyether-bis-amide copolymer, wherein the polymeric component comprises at least one linked voltage stabilizing agent.

27. (withdrawn) The implantable medical lead of claim 26 selected from the group consisting of a cardiac pacing lead, a tachycardia lead and a neurological lead.

28. (previously presented) A device comprising an electrically insulating material comprising a polymeric component and at least one linked voltage stabilizing agent, wherein the device is selected from the group consisting of a transformer, a capacitor, a high voltage cable, and a lead, and wherein the voltage stabilizing agent is covalently lined to or within the polymeric component.

29. (withdrawn) A capacitor comprising a solid dielectric layer comprising an electrically insulating material comprising a polymeric component comprising at least one linked voltage stabilizing agent.

30. (previously presented) A high voltage cable comprising an electrically insulating material comprising a polymeric component and at least one linked voltage stabilizing agent, wherein the voltage stabilizing agent is covalently lined to or within the polymeric component.

31. (withdrawn) An adhesive comprising an electrically insulating material comprising silicone comprising at least one linked voltage stabilizing agent.

32. (withdrawn) An electrically insulating fluid comprising silicone comprising at least one linked voltage stabilizing agent.

33. (withdrawn) The insulating fluid of claim 32 which is a transformer fluid or a capacitor electrolyte fluid.

34. (withdrawn) A polymer blend comprising a first polymer comprising at least one linked voltage stabilizing agent and a second polymer.

35. (withdrawn) The polymer blend of claim 34, wherein the first polymer comprises a polymer selected from the group consisting of a silicone, a polyurethane, a polyolefin, a polyacetal, a polycarbonate, a polyvinyl, a polyamide, a polyimide, a polyacrylic, a polystyrene, a polysulfone, a polyetherketone, a cellulosic, a polyester, a polyether, a fluoropolymer, and copolymers thereof.

36. (withdrawn)The polymer blend of claim 35 in which at least one of the first and second polymers is crosslinked.

37. (currently amended) The polymer blend of [claim 34] comprising a first polymer comprising at least one linked voltage stabilizing agent and a second polymer, wherein the first polymer comprises a polymer selected from the group consisting of a silicone, a polyurethane, a polyolefin, a polyacetal, a polycarbonate, a polyvinyl, a polyamide, a polyimide, a polyacrylic, a polystyrene, a polysulfone, a polyetherketone, a cellulosic, a polyester, a polyether, a fluoropolymer, and copolymers thereof, wherein [The]the polymer blend [of claim 35 comprising] forms an interpenetrating polymer network.

38. (original) The polymer blend of claim 35 in which the first and second polymers are not crosslinked.

39. (canceled) An electrically insulating material comprising the polymer blend of claim 35.

40. (canceled) A highly loaded polymer comprising at least one linked voltage stabilizing agent in an amount greater than about 50%, by weight.

41. (canceled) The highly loaded polymer of claim 40 wherein the linked voltage stabilizing agent is present in an amount greater than about 70%, by weight.

42. (canceled) A method for making a polymer blend comprising blending a first polymer comprising at least one linked voltage stabilizing agent with a second polymer.

43. (canceled) The method of claim 42 wherein blending is effected by physical admixing, melt blending, solvent casting, or dissolution.

44. (canceled) The method of claim 42 wherein the first polymer is a highly loaded polymer comprising at least one linked voltage stabilizing agent in an amount greater than about 50%, by weight.